

JOB MOTIVATION FACTORS AS PERCEIVED
BY TEACHERS AND NURSES

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Doctor of Education

by
Judy I. Thomas
July 1983

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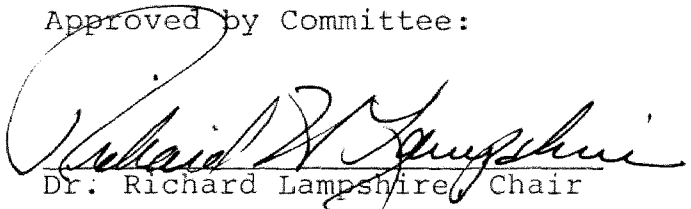
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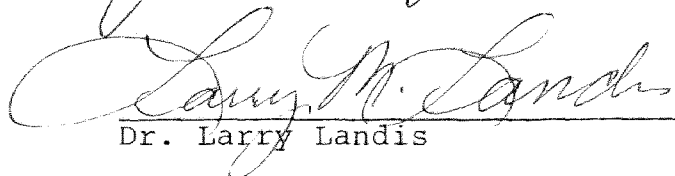
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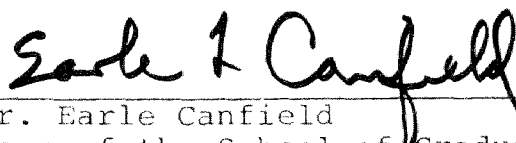
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An abstract of a Dissertation by
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July 1983
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The problem. The two-factor theory of motivation to work developed by Frederick Herzberg provided the conceptual framework for this study. The general purposes of the study were to discover whether nurses and teachers perceived either motivation or hygiene factors to be greater motivators, whether those job factors were present in their jobs, whether there was a difference between the job factors desired by nurses and the factors desired by teachers, and whether there was a difference in the degree to which nursing and education provide the needed job factors.

Procedure. Thirty-nine teachers and thirty-one nurses returned a questionnaire which indicated the degrees to which they perceived themselves as motivated by sixteen job factors and the degree to which the factors were present in their jobs. Means were computed for motivation factors needed, motivation factors present, hygiene factors needed, hygiene factors present, and means were tested by separate variance model t test for significant differences ($\alpha.05$) between means.

Conclusions. It was found that neither teachers nor nurses perceived a greater need for either motivation or for hygiene factors. Neither group felt that one set of job factors was present in their jobs to a greater degree than the other set. Nurses felt, however, that their jobs provided motivation and hygiene factors to a greater degree than teachers felt their jobs provided them. Both groups felt that they needed motivation and hygiene factors to a greater degree than those factors were present in their jobs.

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CHAPTER ONE

Rationale and Statement of the Problem

Introduction

Persons ultimately settle on their particular careers for reasons as unique as the individuals themselves. The rewards that different individuals seek in their professions and the job factors that motivate them will be equally varied. It is speculated that those persons who choose and perform in the helping professions do so because they are motivated by the nature of the work itself, rather than by reasons of material gain or personal ease.

Frederick Herzberg investigated job attitudes and worker motivation.¹ His investigations led him to develop a theory of motivation in which satisfaction and dissatisfaction on the job are not opposite ends of the same continuum. Rather, his theory describes two distinct and separate sets of job factors--motivation factors and hygiene factors--which account for two separate sets of feelings--satisfaction and dissatisfaction--in people at work. The two sets of factors can be illustrated as follows:

¹Frederick Herzberg, Work and the Nature of Man (New York: Thomas Y. Crowell, 1966), pp. 71-91.

MOTIVATION
FACTORS:
SATISFIERS

Achievement
Recognition
Work itself
Responsibility
Advancement

HYGIENE
FACTORS:
DISSATISFIERS

Salary	Policy and
Chance for growth	administration
Interpersonal	Working conditions
relationships	Job security
Status	Personal life
Supervision	

Presence of
satisfiers leads
to increased
motivation and
performance

Lack of hygiene factors leads to job
dissatisfaction and decreased
performance

The motivation factors relate to the nature of the work itself. The presence of motivation factors is necessary for personal growth and feelings of self-fulfillment, and lead to superior performance and effort. The hygiene factors describe the situation or environment in which the employee performs his/her job, including the extrinsic rewards s/he receives, such as salary and fringe benefits. These are needs based on the avoidance of unpleasantness. Absence of adequate hygiene factors leads to job dissatisfaction and decreased performance.

Elimination of dissatisfiers does not automatically produce job satisfaction, only lack of dissatisfaction. Nor does removal of satisfiers produce dissatisfaction, but rather no job satisfaction. According to the motivation-hygiene theory, maximum production can be realized by

providing adequate job hygiene through the removal of dissatisfiers while providing the motivation factors necessary for increased performance.

Statement of the Problem

Job descriptions list minimum standards. Many employees meet those standards and exert no further effort. We do find, however, employees who not only meet standards, but exceed them. In an industry that produces a product, such as the automotive industry, the results of this increased motivation to produce are identifiable and quantifiable: increased production rates, for example, or fewer returns for repairs. The bottom line is production and profit. Where a tangible product is not the end result, however, it is more difficult to assess the effects of increased or decreased motivation.

Members of the helping professions, such as education, nursing, social work, and counseling, deal with a human product that is difficult to quantify. Though job performance is difficult to measure in terms of a finished product, agreement can be reached, at least at an abstract level, that some of these workers do contribute more to their jobs than others. What is the difference then between those who meet only minimum standards and those who go beyond? If we can assume that more highly motivated workers are more productive, then we must uncover the job factors that will motivate them to produce their best efforts.

If it is true that members of the helping professions are attracted by the intrinsic rewards of the job itself, rather than by extrinsic rewards, then it could be said that such workers are more motivated by Herzberg's motivation factors than by the hygiene factors.

The purpose of this study was to explore the following general questions for two groups in the helping professions, teachers and nurses:

1. Do nurses and educators perceive either motivation or hygiene factors as being greater motivators?
2. Are the job factors they perceive as motivators present in their jobs?
3. Is there a difference between the job factors that educators perceive as being motivators and the job factors that nurses perceive as being motivators?
4. Is there a difference in the degree to which the nursing profession and public education provide the needed job factors, as perceived by their employees?

Definitions of Terms

Hygiene factors: Those job factors which, when not present or adequately provided for, lead to job dissatisfaction and therefore to decreased motivation to work. As identified by Herzberg, they are:

- Salary
- Chance for growth
- Interpersonal relationships
- Status
- Supervision

Policy and administration
Working conditions
Job security
Personal life

Motivation factors: Those job factors which, when present or adequately provided for, lead to job satisfaction and therefore to increased motivation to work. As identified by Herzberg, they are:

Achievement
Recognition
Work itself
Responsibility
Advancement

Job factors needed: The motivation and/or hygiene job factors which the employee perceives as being a motivator to increased performance on the job.

Job factors present: The motivation and/or hygiene job factors which the employee perceives as being present in his/her job.

Questions

The four general questions stated in the Statement of the Problem raise the following specific questions which this study sought to answer:

1. Do educators have a greater need for motivation factors or for hygiene factors?
2. Do nurses have a greater need for motivation factors or for hygiene factors?
3. Do educators' jobs provide more motivation factors or more hygiene factors?

4. Do nurses' jobs provide more motivation factors or more hygiene factors?

5. Is there a difference in the degree to which educators and the degree to which nurses need motivation factors?

6. Is there a difference in the degree to which educators and the degree to which nurses need hygiene factors?

7. Is there a difference in the degree to which educators' jobs and the degree to which nurses' jobs provide motivation factors?

8. Is there a difference in the degree to which educators' jobs and the degree to which nurses' jobs provide hygiene factors?

9. Is there any discrepancy between the motivation factors educators need and the motivation factors that are present in their jobs?

10. Is there any discrepancy between the motivation factors nurses need and the motivation factors that are present in their jobs?

11. Is there any discrepancy between the hygiene factors educators need and the hygiene factors present in their jobs?

12. Is there any discrepancy between the hygiene factors nurses need and the hygiene factors present in their jobs?

Hypotheses

Following are the null hypotheses tested, which were developed from the preceding questions.

H_O^1 : There is no difference in the degree to which educators need motivation factors and the degree to which they need hygiene factors.

H_O^2 : There is no difference in the degree to which nurses need motivation factors and the degree to which they need hygiene factors.

H_O^3 : There is no difference in the degree to which educators' jobs provide motivation factors and the degree to which they provide hygiene factors.

H_O^4 : There is no difference in the degree to which nurses' jobs provide motivation factors and the degree to which they provide hygiene factors.

H_O^5 : There is no difference in the degree to which educators need motivation factors and the degree to which nurses need motivation factors.

H_O^6 : There is no difference in the degree to which educators need hygiene factors and the degree to which nurses need hygiene factors.

H_O^7 : There is no difference in the degree to which educators' jobs provide motivation factors and the degree to which nurses' jobs provide motivation factors.

H_O^8 : There is no difference in the degree to which educators' jobs provide hygiene factors and the degree to which nurses' jobs provide hygiene factors.

H_O^9 : There is no difference in the degree to which educators need motivation factors and the degree to which motivation factors are present in their jobs.

H_O^{10} : There is no difference in the degree to which nurses need motivation factors and the degree to which motivation factors are present in their jobs.

H_O^{11} : There is no difference in the degree to which educators need hygiene factors and the degree to which they are present in their jobs.

H_O^{12} : There is no difference in the degree to which nurses need hygiene factors and the degree to which hygiene factors are present in their jobs.

Figure 1 has been developed to provide a more graphic representation of the relationships among the various hypotheses tested.

The following chapter will serve to further acquaint the reader with the motivation-hygiene theory of Herzberg, particularly as it relates to Maslow's theory of human needs. Pertinent studies based upon these theories will also be discussed.

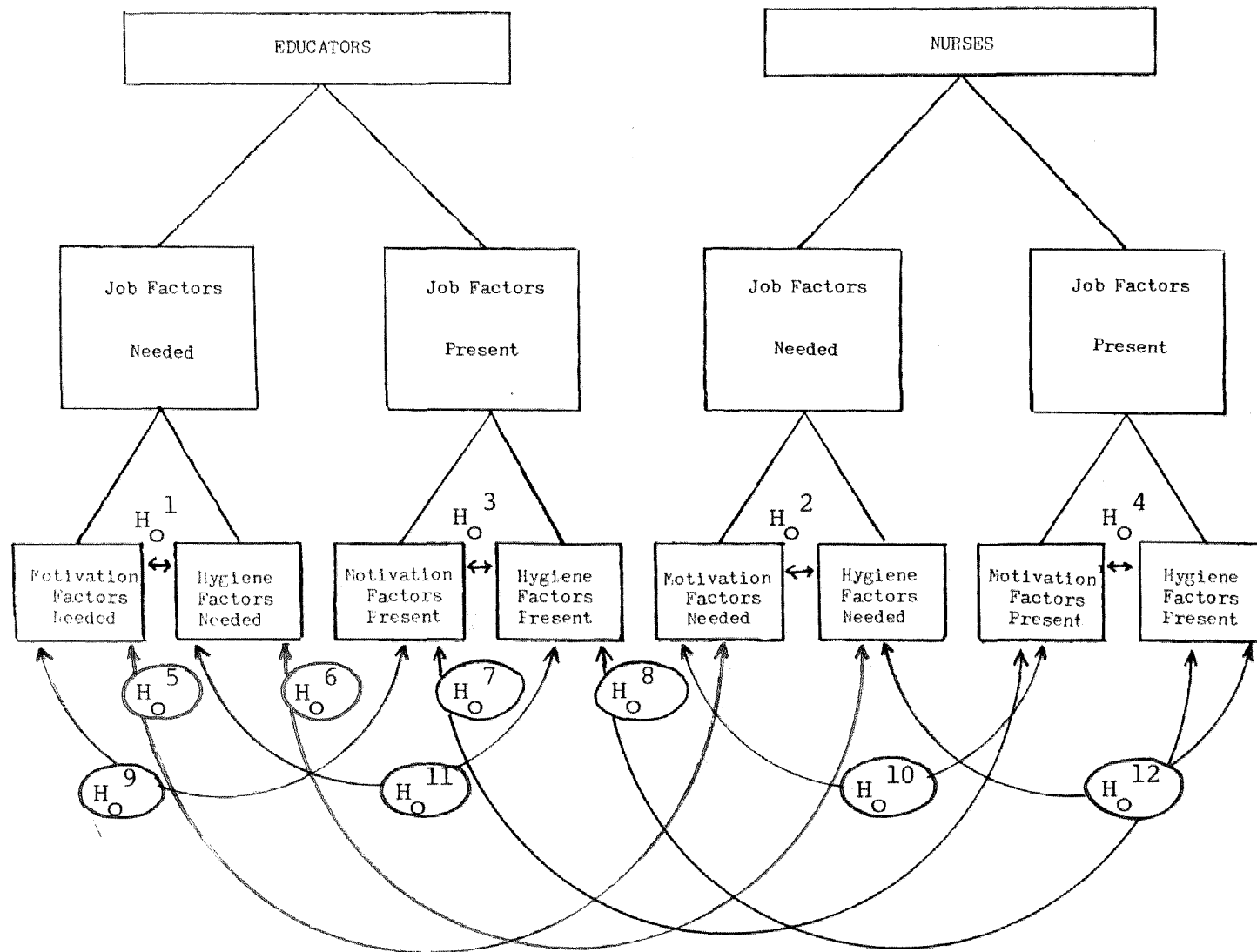


Figure 1

Relationships Among Hypotheses to be Tested

CHAPTER TWO

Review of the Literature

Early interest in job satisfaction research arose from the assumption that more satisfied workers would be more productive.¹ Some researchers, however, Lawler and Porter among them, hold a reverse point of view: more productive workers tend to be more satisfied with their jobs.² March and Simon state that satisfied rats do not perform well in a T-maze, and that similarly we have no reason to predict that high satisfaction will motivate workers.³ In fact, they define motivation as "a present or anticipated state of discontent and a perception of a direct connection between individual production and a new state of satisfaction."⁴

Whether motivation leads to satisfaction or whether satisfaction leads to motivation can be debated at great

¹Edward Holdaway, "Facet and Overall Satisfaction of Teachers," Educational Administration Quarterly, 14, No. 1 (1978), 30.

²E. E. Lawler, Motivation in Work Organizations (Monterrey, California: Brooks and Cole, 1973), p. 85.

³James March and Herbert Simon, Organizations (New York: Wiley, 1958), p. 50.

⁴March and Simon, p. 57.

length. Motivation and satisfaction are probably intertwined and move in a circle. A brief look at Maslow's hierarchy of needs may answer some questions.

Abraham Maslow developed a framework which arranges five levels of needs in a hierarchical order of prepotency.¹ The prepotency feature is important because it specifies that the most basic needs must be reasonably met before a person is interested in working toward satisfying needs in the next higher level. The five need levels in order of prepotency are:

Physiological (air, water, food, personal safety, etc.)

Security (money, benefits, job security, role consolidation, etc.)

Affiliation (acceptance, belonging, group membership, love, etc.)

Self-esteem (competence, confidence, recognition, self-respect, etc.)

Self-actualization (working at top potential, peak satisfaction, achievement, personal and professional success, etc.)

As illustrated in Figure 2, parallels can be drawn between Herzberg's hygiene factors and levels two and three of Maslow's hierarchy and between the motivation factors and levels four and five of the hierarchy.

Maslow's theory states that as long as a need is satisfied, it is not a motivator of behavior. However, no

¹Abraham Maslow, Motivation and Personality (New York: Harper and Row, 1954).

Herzberg		Maslow	
Hygiene	Salary Chance for growth Interpersonal relationships Status Supervision Policy and administration Working conditions Personal life	Security: Money Benefits Job security Role consolidation Affiliation: Acceptance Group membership Belonging Love	Levels Two and Three
	Achievement Recognition Work itself Responsibility Advancement	Self-esteem: Competence Confidence Recognition Self-respect Self-actualization: Working at top potential Peak satisfaction Achievement Personal and professional success	
Motivation			Levels Four and Five

Figure 2

Comparison of Herzberg's Motivation-Hygiene Theory
and Maslow's Hierarchy of Needs

need is ever so completely and totally satisfied that the individual never feels that need again. Human needs are cyclical and recurring. For example, though a person may not be hungry or thirsty at the moment, those needs will reappear with time. By the same reasoning, a person who has gained a sense of achievement through a difficult task well done has not for all time satisfied his/her need for a sense of achievement. Though a need may be currently satisfied and not a motivator, that need will recur in time, producing the "present or anticipated state of discontent" which March and Simon describe.¹

The Motivation-Hygiene Theory

Frederick Herzberg based his motivation-hygiene theory² on the concept that persons have two sets of needs: their needs as animals to avoid pain and their needs as humans to grow psychologically. In the first study, 200 engineers and accountants from a cross-section of Pittsburgh industry were interviewed.³ They were asked about events at work that had resulted in a marked improvement in their job satisfaction or had led to a marked reduction in job satisfaction. Five factors stood out as strong determiners

¹March and Simon, p. 51.

²Herzberg, pp. 71-91.

³Herzberg, p. 71.

of job satisfaction: achievement, recognition, the work itself, responsibility and advancement. These factors appeared very infrequently when describing events that led to dissatisfaction. An entirely different set of factors emerged when respondents described events that led to dissatisfaction: company policy and administration, supervision, salary, interpersonal relations, and working conditions. These factors were rarely mentioned as leading to job satisfaction.

The two sets of job factors have different themes. The factors that contribute to satisfaction all seem to describe a person's relationship to what s/he does: job content, achievement on a task, recognition for task achievement, the nature of the task, responsibility for a task, and professional advancement through growth in task capability. The factors leading to dissatisfaction describe a person's relationship to the context or environment in which s/he performs the job: the kind of administration and supervision received, the nature of interpersonal relationships, working conditions that surround the job, and salary.¹

The factors which lead to satisfaction relate to what the person does and the factors which lead to dissatisfaction relate to the situation in which s/he does the job.

¹Herzberg, p. 74.

Herzberg named the satisfying factors "motivators" because the findings in the study indicate that those factors are effective in motivating the individual to superior performance and effort.¹ The dissatisfying factors were named "hygiene" factors as an analogy to the medical term meaning "preventative and environmental," since those factors mainly describe the environment and serve to prevent job dissatisfaction.²

In summary, the factors involved in producing job satisfaction, the motivators, were separate and distinct from the factors that led to job dissatisfaction, the hygiene factors. Satisfaction and dissatisfaction are not the obverse of each other. Thus, the opposite of job satisfaction is not job dissatisfaction, but no satisfaction. Similarly, the opposite of job dissatisfaction is not satisfaction, but rather no dissatisfaction. Providing for the hygiene factors will not increase motivation since they do not contribute to psychological growth; good hygiene factors simply improve the environment in which the job is performed.³ Motivation requires the substance of a task in order to achieve growth goals.

¹Herzberg, p. 74.

²Herzberg, p. 74.

³Herzberg, pp. 81-82.

The Motivation-Hygiene Theory and Teachers

Probably the most comprehensive application of the motivation-hygiene theory to the work of teachers was made by Thomas Sergiovanni.¹ Pursuant to a contract with the Department of Health, Education and Welfare, Sergiovanni selected a random sample of 127 of the teachers in Monroe County, New York. The overall design of his study followed the design developed and used in Herzberg's original studies. Sergiovanni concluded that the results tended to support Herzberg's findings: factors which contributed to job satisfaction and factors which contributed to job dissatisfaction were mutually exclusive, with the satisfaction factors tending to focus on the work itself while the dissatisfaction factors tended to focus on the conditions of work.²

Specifically, the motivators which appeared significantly to contribute to satisfaction were recognition, achievement, and responsibility. Sergiovanni noted that two factors which appeared as satisfiers in Herzberg's study did not emerge significantly as satisfiers in his own study: advancement and the work itself.³ Since teaching

¹Thomas Sergiovanni, "Factors Which Affect Satisfaction and Dissatisfaction of Teachers," Journal of Educational Administration, 5, No. 1 (1967), 66-82.

²Sergiovanni, p. 81.

³Sergiovanni, pp. 77-78.

offers little opportunity for advancement the potential that advancement has as a motivator appears to be lost for teachers. The work itself emerged as a source of satisfaction as well as dissatisfaction. He suggests that although the job of teaching is potentially able to provide an almost unlimited opportunity for creative and varied work, a considerable amount of the teacher's time is given over to routine, maintenance types of activity, such as lunch duty, taking attendance, checking work, and zipping snowsuits.¹

The hygiene factors which appeared significantly to contribute to dissatisfaction were interpersonal relations with students, interpersonal relations with peers, supervision of their work, school policy and administration, and personal life. The hygiene factors which did not appear significantly as dissatisfiers included salary, possibility of growth, interpersonal relations with superiors, working conditions, status, and job security.²

Edward Holdaway surveyed 801 teachers in the province of Alberta, Canada, for the purpose of ascertaining the relationship between the overall satisfaction teachers felt with their jobs and their satisfaction with different job factors.³ The study was based on Herzberg's motivation-

¹Sergiovanni, p. 78.

²Sergiovanni, p. 75.

³Holdaway, p. 30.

hygiene theory. A questionnaire was developed which asked teachers to rate their degree of overall job satisfaction and their degree of satisfaction on fifty-eight job factors, with provision also made for free response.

For both the free responses and scaled responses the motivation factors were most closely related with overall job satisfaction. The highest correlations were between overall satisfaction and sense of achievement (.70), professional orientation (.61), recognition of your work (.51), and intellectual stimulation in your work (.49). The lowest correlations were between overall satisfaction and many of the contractually negotiable working conditions, which are essentially hygienic in nature: salary (.28), number of hours taught (.26), sabbatical leave provisions (.25), available preparation time (.23), sick leave provisions (.21), and maternity leave provisions (.14).¹

Holdaway's study tends to support Herzberg's two-factor theory, in that the factors which yielded a higher positive correlation with overall job satisfaction were motivation factors. The low correlation between the hygienic factors and overall satisfaction suggests that those factors indeed do not contribute to job satisfaction.²

¹Holdaway, pp. 38-39.

²Holdaway, p. 45.

The Motivation-Hygiene Theory and Nurses

The researcher was unable to uncover any research with nurses based on the motivation-hygiene theory. Benton and White, however, conducted a study in which sixteen job factors were categorized into Maslow's need hierarchy.¹ The job factors corresponded well with the job factors noted by Herzberg. The nurses rated each job factor according to importance to the nurse, degree the factor was present in his/her job, and the degree it should be present in his/her job. The highest ranking in order of importance to the nurse was given to patient care.² Patient care was included with the self-actualization job factors, which correspond with Herzberg's motivation factors. Patient care was followed by adequate personnel per shift and congenial work associates, both hygiene factors. The greatest overall deficiency was perceived to be pay differential for experience, followed by adequate personnel per shift, and inservice training programs, all of which are hygiene factors.³

¹Douglas Benton and Harold White, "Satisfaction of Job Factors for Registered Nurses," Journal of Nursing Administration, November-December, 1972, pp. 55-63.

²Benton and White, p. 57.

³Benton and White, p. 58.

The Motivation-Hygiene Theory and Other
Professional Groups

Sergiovanni and Starratt concluded after their review of motivation-hygiene studies that the theory was indeed appropriate for white-collar and professionally oriented workers.¹ Plate and Stone found that for 162 American and seventy-five Canadian librarians motivators were the primary cause of satisfaction and hygiene factors were the primary cause of dissatisfaction on the job.² The researchers stated that the relationships were not perfect, but were definite and substantial.

Another study utilizing the motivation-hygiene theory was conducted by Shaver with journalism graduates.³ In general, the responses indicated that journalism graduates do develop satisfaction and dissatisfaction with jobs in the way that Herzberg predicts.

The purpose of this paper is to investigate nurses' and teachers' perceptions of their jobs in light of the motivation-hygiene theory. The following chapters describe the methodology of this study and discuss the findings.

¹Thomas Sergiovanni and Robert Starratt, "Analysis of Studies Critical to the Motivation-Hygiene Theory," Personnel Psychology, 20, No. 4 (1967), 391-415.

²Kenneth Plate and Elizabeth Stone, "Factors Affecting Librarians' Job Satisfaction: A Report of Two Studies," Library Quarterly, 44, No. 2 (1974), 97.

³Harold Shaver, "Job Satisfaction and Dissatisfaction Among Journalism Graduates," Journalism Quarterly, 55, No. 1 (1978), 56.

CHAPTER THREE

Methodology and Presentation of Data

A random sample of eighty teachers was selected from among the certified full-time classroom teachers employed by the Des Moines Independent Community School District. Persons such as consultants, teaching principals, and others with supervisory or non-teaching positions were excluded. A random sample of eighty nurses was selected from among the full-time registered staff nurses employed by Iowa Lutheran Hospital. Persons such as floor supervisors, head nurses, and others with supervisory or non-nursing positions were excluded. The teachers were selected from the Des Moines Public Schools Directory,¹ which lists all personnel employed by the Des Moines Public Schools. The nurses were selected from a listing provided by Iowa Lutheran Hospital. The first name on each list was chosen using a table of random numbers. Subsequently, every twentieth name was chosen until eighty names had been selected from each list.

¹This directory is published annually by the Des Moines Independent Community School District, and is distributed to all personnel employed by the district. It lists personnel by building and by alphabetical order. Both listings indicate teachers' assignments. The 1981-82 directory was used.

The questionnaire (see Appendix) was developed based on the descriptions of five motivation job factors and eleven hygiene job factors as defined by Herzberg in his explanation of the motivation-hygiene theory.¹ Each of Herzberg's descriptions of the job factors was synthesized into a short phrase designed to reflect the author's intent. Items 1, 3, 4, 6, 7, 10, 11, 13, 14, 16 and 17 reflect hygiene factors. Items 2, 5, 8, 12 and 15 reflect motivation factors. Teachers and nurses were asked the degree to which they perceived themselves as being motivated by each of the sixteen factors and the degree to which they perceived each of the job factors as being present in their current job.

The questionnaire was validated with a group of ten teacher volunteers and ten nurse volunteers. Their responses were not included in the study. Changes were made in the wording of the opening paragraph on page one of the questionnaire. The questionnaire was sent to the eighty teachers and eighty nurses via the United States mail. A self-addressed stamped envelope was included for return of the questionnaire. Thirty-nine usable questionnaires were returned by teachers and thirty-one by nurses. No follow-up mailing was made. Tallies of responses to the individual items are displayed in Table 1.

¹Herzberg, pp. 193-98.

Table 1

Totals of Teachers' and Nurses' Responses to Each Item on Questionnaires
by Degree of Need and Degree of Presence

Items	Degree Teachers Need				Degree Teachers Have				Degree Nurses Need				Degree Nurses Have			
	1	2	3	4*	1	2	3	4**	1	2	3	4*	1	2	3	4**
1	2	5	24	8	6	19	13	1	0	9	18	13	0	7	16	8
2+	0	3	11	25	11	15	7	6	0	2	11	18	3	14	8	6
3	0	2	16	21	2	10	16	11	0	0	15	16	0	5	15	11
4	0	5	14	20	0	5	19	15	0	0	17	14	1	11	12	7
5+	0	2	15	22	0	6	23	10	0	0	13	18	0	3	16	12
6	1	3	13	22	9	18	9	3	0	3	11	17	1	6	20	4
7	2	8	15	14	17	15	5	2	0	3	20	8	4	10	12	5
8+	0	1	15	23	3	11	19	6	0	2	10	19	0	10	6	15
10	7	5	17	10	4	16	15	4	2	7	17	5	3	12	11	5
11	0	5	18	16	5	17	13	4	1	3	20	7	4	13	13	1
12+	0	2	15	22	0	3	17	18	0	0	11	20	0	1	6	24
13	0	4	14	21	6	13	14	6	0	1	16	14	1	3	16	11
14	0	3	18	18	4	13	14	8	0	0	11	20	1	6	14	10
15+	1	4	18	16	19	13	5	2	0	3	15	13	5	9	13	4
16	2	4	16	17	11	9	16	3	0	0	10	21	3	8	14	6
17	0	1	16	22	1	4	15	19	0	0	10	21	0	0	16	15

+ denotes motivation item; all others are hygiene items.

*1 = hardly motivated at all

2 = somewhat motivated

3 = motivated

4 = greatly motivated

**1 = hardly present at all

2 = present to some degree

3 = present

4 = present to a great degree

A mean was computed for all choices by teacher respondents on the motivation items 2, 5, 8, 12 and 15 on the first page of the questionnaire. This mean represents the degree to which teacher respondents felt they needed motivation factors in order to be motivated to do their best work. Similarly, a mean was computed for all choices of teacher respondents on the hygiene items 1, 3, 4, 6, 7, 10, 11, 13, 14, 16, and 17 on the first page of the questionnaire, which yielded a mean representing the degree to which teacher respondents felt they needed hygiene factors in order to be motivated to do their best work. From the second page of the questionnaire, a mean was computed from the motivation item responses, which reflects the degree to which teachers felt the motivation factors were present in their jobs. A mean was also computed for the hygiene items on page two which reflects the degree to which teachers felt the hygiene items were present. Means were computed in the same fashion for the responses of nurses. These means are displayed in Table 2. A separate variance model t test was employed to test for significant differences between means. Null hypotheses were rejected at $\alpha.05$.

As illustrated by Tables 3 and 4, the results of the t tests on means for H_O^1 , H_O^2 , H_O^3 , H_O^4 , H_O^5 , and H_O^6 fail to reach significance. The null hypotheses are not rejected. It is most likely that there is no greater need perceived by teachers and nurses for either motivation or hygiene job

Table 2

Means and Variances of Job Factors Needed and Job
Factors Present as Perceived by Teachers
and Nurses

	Motivation Factors Needed	Hygiene Factors Needed	Motivation Factors Present	Hygiene Factors Present
Teachers				
\bar{X}	3.46	3.27	2.63	2.54
S^2	.17	.18	.32	.35
Nurses				
\bar{X}	3.52	3.39	3.05	2.90
S^2	.09	.09	.23	.18

Table 3

Comparisons of the Means for Motivation Factors Needed,
Hygiene Factors Needed, Motivation Factors Present,
and Hygiene Factors Present in the Jobs of
Teachers and Nurses

	Motivation Factors		Hygiene Factors		
	\bar{X}	S^2	\bar{X}	S^2	t
Factors Teachers Need	3.46	.17	3.27	.18	2.00
Factors Nurses Need	3.52	.09	3.39	.06	1.88
Factors Teachers Have	2.63	.32	2.54	.35	.69
Factors Nurses Have	3.05	.23	2.90	.18	1.31

$p < .05$

factors. In addition, neither teachers nor nurses perceive any difference in the degree to which motivation factors are present and the degree to which hygiene factors are present in their jobs.

Table 4

Comparisons of the Means for Motivation Factors Needed and Hygiene Factors Needed by Teachers and Nurses

	Teachers		Nurses		t
	\bar{X}	s^2	\bar{X}	s^2	
Motivation Needed	3.46	.17	3.52	.09	.70
Hygiene Needed	3.27	.18	3.39	.06	1.49

$p < .05$

Table 5 illustrates the results of the t tests on the means for H_o^7 and H_o^8 , which do reach significance at $\alpha .05$. The null hypotheses are not retained. The conclusion may then be reached that there is a significant difference in the degree to which teachers and nurses perceive motivation factors and hygiene factors to be present in their jobs. The mean for nurses of 3.05 indicates that nurses feel their jobs provide motivation factors to a greater degree than teachers feel their jobs provide them, with a mean of 2.63. Nurses also feel that their jobs provide hygiene factors to a greater degree than teachers feel their jobs provide them, as evidenced by a mean of 2.90 for nurses and 2.54 for teachers.

Table 5

Comparisons of the Means for Motivation Factors Present
and Hygiene Factors Present in the Jobs of Teachers
and Nurses

	Teachers		Nurses		t
	\bar{X}	S^2	\bar{X}	S^2	
Motivation Present	2.63	.32	3.05	.23	3.36*
Hygiene Present	2.54	.35	2.90	.18	2.96*

* α .05

$p < .05$

As seen in Table 6, the results of the t tests on the means for H_o^9 and H_o^{10} also reach significance. The null hypotheses are not retained. A mean for teachers of 3.46 for motivation needed compared with a mean of 2.63 for motivation factors present indicates that teachers feel that they need motivation factors to a greater degree than those factors are present in their jobs. Nurses perceive a similar discrepancy with a mean of 3.52 for motivation factors needed and a mean of 3.05 for motivation factors present.

The t tests on the means for H_o^{11} and H_o^{12} also yielded significant results, as shown in Table 7. The null hypotheses are not retained. This would indicate that both teachers and nurses feel that they need hygiene factors to a greater degree than those factors are present in their jobs. The means for hygiene factors needed for teachers and nurses

were 3.27 and 3.39, respectively, as compared with means of 2.54 and 2.90 for hygiene factors present.

Table 6

Comparison of the Means for Motivation Factors Needed and Motivation Factors Present in the Jobs of Teachers and Nurses

	Motivation Factors Needed		Motivation Factors Present		t
	\bar{X}	s^2	\bar{X}	s^2	
Teachers	3.46	.17	2.63	.32	7.39*
Nurses	3.52	.09	3.05	.23	4.63*

* α .05

$p < .05$

Table 7

Comparison of the Means for Hygiene Factors Needed and Hygiene Factors Present in the Jobs of Teachers and Nurses

	Hygiene Factors Needed		Hygiene Factors Present		t
	\bar{X}	s^2	\bar{X}	s^2	
Teachers	3.27	.18	2.54	.35	6.26*
Nurses	3.39	.06	2.90	.18	5.58*

* α .05

$p < .05$

Further discussion on the meaning of these results can be found in the following chapter, in which the original questions of the study will be discussed in the light of these findings.

CHAPTER FOUR

Discussion and Recommendations

Upon review of the four original questions of the study, some general conclusions may be drawn and further questions are raised.

Question 1 asked whether nurses and educators perceived either motivation or hygiene factors as being greater motivators. Since there was no great difference in the degree to which either group indicated a need for either set of factors, there would seem to be no support for the idea mentioned in the Statement of the Problem which suggested that members of the helping professions, particularly teachers and nurses, are more motivated by Herzberg's motivation factors than by the hygiene factors. Perhaps teachers and nurses are not the altruistic lot that we have believed them to be. The nursing profession, until the last few years, has been the province of women only. There has also been a preponderance of women in education. There are few persons who would argue the fact that women, their attitudes toward life, and their expectations from it, have changed in the last ten to fifteen years. Many have decided that they are entitled to a part of the American Dream in their own right, and have decided to pursue it.

It may be that teachers and nurses have changed their attitudes toward their jobs, while our perceptions of them have remained static.

Question 2 asked whether the job factors that teachers and nurses perceived as being motivators were present in their jobs. Both groups reported a difference in the degree to which they needed motivation factors and the degree to which motivation factors were present in their jobs. Both groups also reported a difference in the degree to which they needed hygiene factors and the degree to which hygiene factors were present in their jobs. Bearing in mind that provision for hygiene needs brings about only short-lived feelings of satisfaction in workers,¹ it might be expected that a discrepancy would exist between needed and present hygiene factors. Those needs are cyclical and recurring. The fact that both groups also perceived a discrepancy between needed and present motivation factors may uncover a more serious deficiency. Satisfaction of hygiene needs leads only to a state of "no dissatisfaction" for the worker. In order for employees to put forth their best efforts, there must be some opportunity for the worker to achieve satisfaction of the motivation needs. Top performance cannot be expected if motivation factors are not present.

¹Herzberg, p. 80.

Question 3 asked whether there was a difference between the job factors that teachers perceived as being motivators and the job factors that nurses perceived as being motivators. The results of this study suggest that neither group needs motivation factors to a greater degree than does the other group, nor does either group need hygiene factors to a greater degree than does the other group. Both groups felt that they needed both sets of job factors, motivation and hygiene, in order to be motivated to produce their best efforts. This suggests that teachers and nurses are more alike than different in their motivational needs.

Question 4 asked whether there was a difference in the degree to which the two professions provided motivation and hygiene factors for their employees. At this point, a significant difference between teachers and nurses becomes evident. Nurses felt that their jobs provided both motivation and hygiene factors to a greater degree than teachers felt their jobs provided them. This difference raises some interesting points for consideration. Nurses did not express a greater degree of need for hygiene and motivation than did teachers, and yet they feel that their jobs provide more motivation and hygiene than teachers feel their jobs provide. In other words, nurses get more of what they want and need from their jobs than teachers do. It is possible that the nature of nursing tasks is such that

motivation and hygiene needs are more easily met than they are in the tasks teachers perform. Another reason could be personality differences between the two groups as a whole: perhaps nurses are less demanding of their job situations than are teachers, so that they perceive their needs to be met more easily than do teachers. Perhaps teachers' and nurses' roles have been structured in a way that provides more or less opportunity for the satisfaction of needs.

When interpreting the results for Questions 1 through 4, an important warning given by Herzberg must be heeded:

...the lack of "motivators" in jobs will increase the sensitivity of employees to real or imagined bad job hygiene, and consequently the amount and quality of hygiene given to employees must be constantly improved.¹

If that statement holds true for the two groups under study, it may be that the real discrepancy actually lies in the lack of motivation factors, and that this unmet need is producing a felt need for hygiene factors that is not as deep as the statistics might suggest.

Recommendations

The idea that nurses perceived their jobs as providing more opportunity for the satisfaction of motivation and hygiene needs than did teachers deserves further study. There may be differences of age, sex, years of experience, and/or level of educational achievement between the groups

¹Herzberg, p. 80.

which account for this difference. Holdaway found, for example, that as age of the respondent increased, the percentage expressing overall satisfaction also increased.¹ Since Trusty and Sergiovanni's findings indicated that respondents' needs differed significantly with respect to age and sex, but not experience,² further research is recommended to investigate whether such interactions exist for the two groups studied here.

In this study, all of the responses to the hygiene questions and all of the responses to the motivation questions were averaged to find a hygiene needed mean, a motivation needed mean, a hygiene present mean, and a motivation present mean for each group. More precise information could be gathered about the needs of the two groups if responses to each motivation and hygiene item were to be considered separately. Therefore, it is further recommended that research be conducted for the purpose of discovering whether there are any differences between nurses and teachers and between factors needed and factors present with respect to the individual items of motivation and hygiene.

¹Holdaway, p. 38.

²Francis Trusty and Thomas Sergiovanni, "Perceived Need Deficiencies of Teachers and Administrators: A Proposal for Restructuring Teacher Roles," Educational Administration Quarterly, 2 (Autumn 1966), 171.

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APPENDIX

The following pages contain the questionnaires and cover letters as they were sent to the teachers and nurses. Item 9, "Opportunity for input into decisions affecting my job," is neither a hygiene nor a motivation factor according to Herzberg. Other researchers, however, included such job factors with the intrinsic rewards and motivating factors of jobs. Responses to item 9 and the information regarding age, sex, years in the profession, years in present job, level of academic achievement, and comments were not used in the analysis of this data, and were collected incidentally for possible use in a future study.

November 8, 1982

Dear Educator,

WHY DO TEACHERS TEACH? WHAT MOTIVATES THEM TO PRODUCE THEIR BEST EFFORTS?

You can help find an answer to those questions by taking five or ten minutes of your time to answer and return the enclosed questionnaire.

I am a teacher in Des Moines and I am conducting parallel research with teachers and nurses as part of my degree program at Drake University. This study is not connected in any way with the Des Moines Public Schools. The confidentiality of all replies will be strictly maintained.

I would be happy to share the results of this survey with you. If you will return the slip at the bottom with your questionnaire (or under separate cover, if you prefer) I will send you the results as soon as they are available.

Again I assure you that the confidentiality of your reply will be strictly guarded. Thank you in advance for your help and participation in this research.

With appreciation,

Judy I. Thomas

* * * * *

I am interested in the results of your survey. Please send them as soon as they are available.

Name _____

Address _____

_____ Zip _____

To what degree do you feel you would be motivated to do your best following job factors, if they existed in your job?

1. Hardly at all
2. Somewhat motivated
3. Motivated
4. Greatly motivated

1. The opportunity to acquire new skills
2. Praise and compliments for my work
3. Good interpersonal relationships with superiors
4. Good interpersonal relationships with peers
5. Successful completion of tasks
6. Sufficient salary and fringe benefits
7. High job status
8. A job with the kind of tasks I like to do
9. The opportunity for input into decisions affecting my job
10. Proper supervision of my work by superiors
11. Company policy and administration with which I agree
12. Feeling of responsibility for my work
13. Adequate working conditions: facilities and equipment
14. Job security, possibility of continued employment
15. Promotions and/or advancements
16. Positive effects of the job on my personal life
17. Good relationships with students

Please complete the next page also.

To what degree do you feel that the following job factors are present .

1. Hardly at all
2. Present to some degree
3. Present
4. Present to a great degree

1. The opportunity to acquire new skills
2. Praise and compliments for my work
3. Good interpersonal relationships with superiors
4. Good interpersonal relationships with peers
5. Successful completion of tasks
6. Sufficient salary and fringe benefits
7. High job status
8. The kind of tasks I like to do
9. The opportunity for input into decisions affecting my job . .
10. Proper supervision of my work by superiors
11. Company policy and administration with which I agree . . .
12. Feeling of responsibility for my work
13. Adequate working conditions: facilities and equipment . . .
14. Job security, possibility of continued employment
15. Promotions and/or advancements
16. Positive effects of the job on my personal life
17. Good relationships with students

The following information is optional, but would greatly assist the rese

Years in teaching _____ Age _____
Years in present assignment _____ Male _____ Female _____
Level of educational achievement _____

Comments? Please write them on the back, if you like.

Thank You!

*

November 1, 1982

Dear Health Care Professional,

WHY DO NURSES NURSE? WHAT MOTIVATES THEM TO PRODUCE THEIR BEST EFFORTS?

You can help find an answer to those questions by taking five or ten minutes of your time to answer and return the enclosed questionnaire.

This research, though approved by Iowa Lutheran, is not sponsored by the hospital. Results will be made available to the hospital, but the confidentiality of individual replies will be strictly maintained.

I am a teacher in Des Moines and I am conducting parallel research with teachers and nurses as part of my degree program at Drake University. I would be happy to share the results with you. If you will return the slip at the bottom of this page with your questionnaire (or under separate cover, if you prefer), I will send you the results as soon as they are available.

Again I assure you that the confidentiality of your reply will be strictly guarded. Thank you in advance for your help and participation in this research.

With appreciation,

Judy I. Thomas

* * * * *

I am interested in the results of your survey. Please send them as soon as they are available.

Name _____

Address _____

_____ Zip _____

*

To what degree do you feel you would be motivated to do your best work by the following job factors, if they existed in your job?

1. Hardly at all
2. Somewhat motivated
3. Motivated
4. Greatly motivated

1. The opportunity to acquire new skills 1 2 3 4
2. Praise and compliments for my work 1 2 3 4
3. Good interpersonal relationships with peers 1 2 3 4
4. Good interpersonal relationships with superiors 1 2 3 4
5. Successful completion of tasks 1 2 3 4
6. Sufficient salary and fringe benefits 1 2 3 4
7. High job status 1 2 3 4
8. A job with the kind of tasks I like to do 1 2 3 4
9. The opportunity for input into decisions affecting my job 1 2 3 4
10. Proper supervision of my work by superiors 1 2 3 4
11. Company policy and administration with which I agree 1 2 3 4
12. Feeling of responsibility for my work 1 2 3 4
13. Adequate working conditions: facilities and equipment 1 2 3 4
14. Job security, possibility of continued employment 1 2 3 4
15. Promotions and/or advancements 1 2 3 4
16. Positive effects of the job on my personal life 1 2 3 4
17. Good relationships with patients 1 2 3 4

Please complete the next page also.

*

To what degree do you feel that the following job factors are present in your job?

1. Hardly at all
2. Present to some degree
3. Present
4. Present to a great degree

1. The opportunity to acquire new skills 1 2 3 4
2. Praise and compliments for my work 1 2 3 4
3. Good interpersonal relationships with peers 1 2 3 4
4. Good interpersonal relationships with superiors 1 2 3 4
5. Successful completion of tasks 1 2 3 4
6. Sufficient salary and fringe benefits 1 2 3 4
7. High job status 1 2 3 4
8. The kind of tasks I like to do 1 2 3 4
9. The opportunity for input into decisions affecting my job 1 2 3 4
10. Proper supervision of my work by superiors 1 2 3 4
11. Company policy and administration with which I agree 1 2 3 4
12. Feeling of responsibility for my work 1 2 3 4
13. Adequate working conditions: facilities and equipment 1 2 3 4
14. Job security, possibility of continued employment 1 2 3 4
15. Promotions and/or advancements 1 2 3 4
16. Positive effects of the job on my personal life 1 2 3 4
17. Good relationships with patients 1 2 3 4

The following information is optional, but would greatly assist the researcher:

Years in nursing _____ Age _____
 Years in present job _____ Male _____ Female _____
 Level of educational achievement _____

Comments? Please write them on the back, if you like.

Thank You!